



Dolby IMS1000/Dolby IMS2000 firmware release notes

Release v4.6.5
4 January 2018

1 Introduction

This documentation provides the installation instructions and describes new features, bug fixes, other improvements, and known issues for the Dolby IMS1000/Dolby IMS2000 firmware.

Contacting Dolby

Contact Dolby Cinema Technical Support

- Send an email to cinemasupport@dolby.com.
- Call:

Americas: +1-415-645-4900

Europe/Middle East/Africa (EMEA): +44-1793-842-130

Asia-Pacific (APAC): +86-400-692-6780

Japan: +81-3-4540-6782

Access documentation

Visit www.dolbycustomer.com.

Submit feedback about this documentation

Send an email to documentation@dolby.com.

2 Installing the Dolby IMS1000/Dolby IMS2000 firmware

You can install the Dolby IMS1000/Dolby IMS2000 firmware using the **Ingest Manager Upload** feature or File Transfer Protocol (FTP).

2.1 Dolby IMS1000/Dolby IMS2000 firmware installation overview

Before you can install the Dolby IMS1000/Dolby IMS2000 firmware, you must obtain a firmware package and a Dolby License Message (DLM) from Dolby.

Dolby IMS1000/Dolby IMS2000 firmware v4.6.5 requires the `ims_fw-4.6.5-D.pkg` package. You also need a DLM to install the firmware package. Each DLM requires the serial number for your Dolby IMS1000 or Dolby IMS2000. All files are available on service@ftp.cinema.dolby.com. For FTP credentials, contact Dolby Cinema Technical Support.

2.2 Installing the Dolby IMS1000/Dolby IMS2000 firmware using the Ingest Manager Upload

You can install the Dolby IMS1000/Dolby IMS2000 firmware package and DLM using the **Ingest Manager Upload** feature.

Prerequisites

You have received the Dolby IMS1000/Dolby IMS2000 firmware package and DLM from Dolby.

Procedure

1. After you download both the DLM and firmware packages, save them onto your computer.
2. Open a web browser, and then log in to the Dolby IMS1000/Dolby IMS2000 web user interface (UI).
3. Navigate to **Control > Ingest Manager > Upload**.
4. Click **Choose Files**, and then select the DLM first.
5. Click **Upload**.

The DLM installs in the background.

6. After the DLM installs, click **Choose Files** again, and then select the firmware package.
 7. Click **Upload**.
 8. After the firmware package is ingested, reboot the Dolby IMS1000 or the Dolby IMS2000.
- The firmware package installs in the background.

2.3 Installing the Dolby IMS1000/Dolby IMS2000 firmware using FTP

You can install the Dolby IMS1000/Dolby IMS2000 firmware package and DLM using FTP.

Prerequisites

You have received the Dolby IMS1000/Dolby IMS2000 firmware package and DLM from Dolby.

Procedure

1. Open an FTP client from your computer.
2. Enter the IP address for the Dolby IMS1000 or the Dolby IMS2000, and then log in as **admin**.
3. Find the DLM and firmware package, and then upload these items to the **/etc/rc.once** directory.
4. Reboot the Dolby IMS1000 or the Dolby IMS2000.

Results

You are now ready to use the Dolby IMS1000/Dolby IMS2000 firmware.

3 Dolby IMS1000/Dolby IMS2000 firmware v4.6.5 release notes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.5 includes bug fixes.

3.1 Dolby IMS1000/Dolby IMS2000 firmware v4.6.5 bug fixes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.5 includes bug fixes.

Fixed a rare issue which caused a slight image discoloration to display on one half of the screen. [DCPLYR-416]

4 Dolby IMS1000/Dolby IMS2000 firmware v4.6.4 release notes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.4 includes bug fixes.

4.1 Dolby IMS1000/Dolby IMS2000 firmware v4.6.4 bug fixes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.4 includes bug fixes.

Fixed an issue that caused the server to crash when switching from HDMI to internal Digital Cinema Package (DCP) playback. [DCPLYR-2945]

5 Dolby IMS1000/Dolby IMS2000 firmware v4.6.3 release notes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.3 includes bug fixes and known issues.

5.1 Dolby IMS1000/Dolby IMS2000 firmware v4.6.3 bug fixes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.3 includes bug fixes.

- Fixed an issue where the ultra-high definition (UHD) output was incorrectly cropped when using an HDMI source. [DCPLYR-763]

5.2 Dolby IMS1000/Dolby IMS2000 firmware v4.6.3 known issues

Dolby IMS1000/Dolby IMS2000 firmware v4.6.3 has issues that are known to cause problems. Where applicable, suggested workarounds are provided.

Issue 1

A rare issue causes a slight image discoloration to display on one half of the screen.

6 Dolby IMS1000/Dolby IMS2000 firmware v4.6.1 release notes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.1 includes bug fixes.

6.1 Dolby IMS1000/Dolby IMS2000 firmware v4.6.1 bug fixes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.1 includes bug fixes.

- Fixed an issue with audio for a seamless composition playlist (CPL) that contained different audio channel numbers.
- Fixed an issue with dual Dolby IMS2000 configuration when playing 2D CPLs with fps higher than 30 fps while in Passive mode.

7 Dolby IMS1000/Dolby IMS2000 firmware v4.6.0 release notes

Dolby IMS1000/Dolby IMS2000 firmware v4.6.0 includes bug fixes and known issues.

7.1 Dolby IMS1000/Dolby IMS2000 firmware v4.6.0 bug fixes

Dolby IMS1000/Dolby IMS2000 firmware includes bug fixes.

- Fixed an issue that caused flashing when switching from HDMI to Internal mode.
- Fixed an issue where the wrong video output was used after playing a high frame rate (HFR) show playlist (SPL) and switching the video source to HDMI.
- Fixed an issue preventing the Dolby IMS2000 from rebooting with Peripheral Component Interconnect (PCI) errors.
- Fixed an issue that resulted in bad color configuration with HDMI 4K in a dual projector configuration.
- Fixed an issue that improperly configured decoders (pthread issues).
- Fixed an issue that caused dual Dolby IMS2000 audio noise on Advanced Encryption Standard (AES) in MPEG 1080i/30 3D passive mode.
- Fixed an issue on dual Dolby IMS2000 4K 3D that caused subtitle depth (Z Position) errors.
- Fixed an issue that caused picture errors on dual Dolby IMS2000 configuration on Link Decrypter with the HDMI input 4K/UHD.
- Fixed an issue that caused a dual Dolby IMS2000 configuration image problem on Link Decrypter when switching between 4K and HFR.
- Fixed an issue that caused Dolby IMS2000 serial digital interface (SDI) input audio noise.
- Fixed an issue that caused picture problems on Link Decrypter on the dual Dolby IMS2000 HDMI input UHD.
- Fixed an issue that caused untimely resynchronization on dual Dolby IMS2000 HDMI input UHD during a show.
- Fixed an issue with the SDI input when switching to **Pull-down/No Pull-down**.
- Fixed an issue that caused picture errors when switching from HDMI input to SDI input.

7.2 Dolby IMS1000/Dolby IMS2000 firmware v4.6.0 known issues

Dolby IMS1000/Dolby IMS2000 firmware v4.6.0 has issues that are known to cause problems. Where applicable, suggested workarounds are provided.

Issue 1

SDI input voltage-controlled crystal oscillator (VCXO) stabilization issue, depending on the SDI source.

Issue 2

Dual Dolby IMS2000 HDMI in Secure Digital (SD) 576p/480p last pixel column issue on Link Decrypter.

Issue 3

Dual Dolby IMS2000 frame-rate issue with a 2D CPL with fps greater than 30 in passive mode.

Issue 4

Image persistence issue when disconnecting an HDMI source with 4K/UHD.

8 Documentation revision history

The documentation revision history lists the date, issue number, and description of all publications of the Dolby IMS1000/Dolby IMS2000 firmware release notes.

Date	Issue	Description
15 October 2015	1	Release notes added for firmware v4.6.0
29 March 2016	2	Release notes added for firmware v4.6.1
08 June 2017	3	Release notes added for firmware v4.6.3
13 July 2017	4	Release notes added for firmware v4.6.4
04 January 2018	5	Release notes added for firmware v4.6.5

Glossary

AES

Advanced Encryption Standard. A standard established by the National Institute of Standards and Technology (NIST) that specifies the AES algorithm (NIST FIPS 197).

CPL

Composition playlist. A composition playlist represents a complete digital cinema work, which may include features, trailers, teasers, and advertisements.

DCP

Digital Cinema Package. A packing list (PKL) file and all of the files that it references.

DLM

Dolby License Message.

HDMI

High-Definition Multimedia Interface. A high-speed, high-capacity format for transferring digital information and the specific hardware interface for the format.

HFR

High frame rate. Refers to a composition with a frame rate at 48 fps or higher that provides more visual information and reduced motion blur.

fps

Frames per second. The number of unique consecutive images (frames) an imaging device produces in one second.

FTP

File Transfer Protocol. A network-based protocol designed for transferring data using a client-server architecture.

FPGA

Field-programmable gate array. An integrated circuit (IC) that users can reprogram “in the field” after manufacture.

IP address

Internet Protocol address. A numerical identifier assigned to a device that is a member of a network that uses the IP for communication.

MPEG

Moving Picture Experts Group. An ISO/IEC working group that develops video and audio encoding standards. Also the name of a family of digital video and audio coding standards.

PCI

Peripheral Component Interconnect. A local computer bus that supports functions in a standardized format.

SD

Secure Digital. Secure Digital is a memory card format for use in portable devices such as mobile phones and tablet computers.

SDI

Serial digital interface.

SPL

Show playlist. A playlist that defines one digital cinema show and is made up of a sequence of composition playlists (CPLs) that are associated with automation events, inserts (black pattern and others), or both.

UHD

Ultra-high definition. Ultra-high-definition television or video, with a display resolution of 3840×2160 pixels in the 16:9 aspect ratio. Also referred to as 2160p.

UI

User interface.

USB

Universal Serial Bus. A standard that defines the cables, connectors, and communications protocols used in connections between computers and electronic devices.

VCXO

Voltage-controlled crystal oscillator. An oscillator whose frequency can be controlled by external voltage.

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Dolby Laboratories, Inc.

1275 Market Street

San Francisco, CA 94103-1410 USA

Telephone 415-558-0200

Fax 415-863-1373
<http://www.dolby.com>

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